

HYPERBARIC OXYGEN THERAPY

Promoting health and wellness as we age



HYPERBARIC OXYGEN THERAPY

- Oxygen is the essence of life
 - Without food, a person can live approximately 3 weeks
 - Without water, a person can live between 3-5 days
 - Without oxygen, biological death occurs between 4-6 minutes
 - Certain variances can be seen based on temperature and saturation
- Every cell in our body requires oxygen to enable key systems to function
 - Cognitive function
 - Memory
 - Healing
 - Immune System
 - Inflammatory Responses

REVERSE AGING

- New term that has started to appear in the literature
- Goal-

Extension of Life in Years
(existence)

vs.

Increasing Quality of Life
(throughout entire life cycle)

North Americans live an average of 73.7 years, but spend their last 11.7 years in "dysfunctional life"

THE PROCESS OF AGING

- Gradual loss of microcirculation in all organs-
- Diminishing oxygen availability -
- Impaired Function- directly related to Energy Production- (Mitochondria)
- Increase in aches and pains- Availability of Oxygen+ Accumulation of Toxins resulting in mitochondrial dysfunction and oxidative stress damage to mitochondrial DNA

THE MAJOR FUNCTION HYPERBARIC OXYGEN

- Targeted Stem Cell Therapy
 - 200% Increase in Circulating Stem Cells (CD 34) after 2 treatments
 - 800% Increase in Circulating Stem Cells (CD 34) after 80 treatments
- Exaggeration of Oxygen Gradient- Emphasizes Drop-off in Oxygen availability between tissues with adequate microcirculation.
- Restoring Balance in Oxygen Free Radicals-
 - In a healthy state, about 20% of the oxygen we breathe forms free radicals.
 - **In an unhealthy state up to 80% of the oxygen we breathe forms free radicals.**



THE ROLE OF HYPERBARIC OXYGEN

- Tied to Relief of-

Hypoxia

Inflammation

THE ROLE OF HYPERBARIC OXYGEN

- Studies have shown Hyperbaric Oxygen Therapy to:
 - Improve oxygenation to all organs and body tissue
 - Improve memory and cognitive function
 - Promote neuroplasticity
 - Help Maintain Skin Elasticity-supporting production of Collagen
 - Supports Immune System Function
 - Promotes Stem Cell Proliferation and Mobilization
 - Improves Stamina and Mobility
 - Reduces stress and anxiety
 - Reduces Fatigue
 - Reduces inflammation and pain
 - Accelerates Healing



THE ROLE OF HYPERBARIC OXYGEN

- Stimulant promoting and activating gene sequences that code for growth of new blood vessels and repair hormones
- Intermittent hyperbaric oxygen treatments in stroke patients results in a decreased incidence of recurrent strokes
- HBOT promotes cell repair, reversing age spots, saggy skin, wrinkles, poor collagen structure, and skin cell damage by increasing circulation to the most peripheral areas of the body

EMERGING ROLE FOR HYPERBARIC OXYGEN

- Surgical support-
 - Presurgical Treatment- Reduce the possibility for complications and adverse outcomes (2-3 treatments prior to surgery)
 - Post- surgical Treatment- Accelerate recovery and lessens possibility of post - surgical infections (2 treatments)



OXYGEN IS THE ESSENCE OF LIFE

- Availability of oxygen ensures maximum function of all tissues and organs
- Clinical Studies have demonstrated the benefits of Hyperbaric Oxygen for reducing the effects of conditions of age-related degeneration by providing oxygen at the cellular level to promote health and well-being